

APPENDIX A - EXAMPLE DIRECTIONS

This is a test of your radiological protection knowledge. If you score 80 percent or better on this exam, you will be excepted from the classroom portion of radiological protection training.

Do not mark on the exam booklet. Place all answers on the answer sheet. Use scratch paper or the **back** of your answer sheet for any calculations.

Decide which is the **best** answer from among the alternatives, then mark the appropriate space on the answer sheet. There is only one correct answer for each question. Your answer sheet will be scored mechanically, so it is very important you mark your answers correctly.

1. Mark only **one** space for each question on the answer sheet.
2. Use **only** a No. 2 lead pencil on the answer sheet.
3. Make sure your mark fills the space, but does not go outside the space.
4. If you change your mind, erase your first mark completely and make another mark.
5. Keep your answer sheet clean; stray marks may be counted as errors.
6. Since all unmarked questions will be counted as wrong, answer all questions even if you are uncertain which answer is correct.
7. If there are questions during the examination, raise your hand and the proctor will come to you.

If you have any questions, ask the exam proctor now.

You have 45 minutes to complete this exam. If you finish early, check your work. Be sure that you have answered all the questions.

You may begin.

APPENDIX B - BRIEFING CHECKLIST-ORAL EXAMINATION

1. Trainees are tested at the level of position responsibility for which they are being qualified.
2. Facility equipment should not be operated without permission from appropriate authority. Nothing the instructor says or asks will be intended to violate that principle.
3. If clarification of questions is needed by trainees during the tests, there should be no hesitation to request that the instructor reword or clarify the question.
4. The instructor will be taking notes throughout the test to document trainees performances. Frequently an instructor will stop questioning for this purpose. The amount of note-taking is not dependent upon the trainee's level of performance. The instructor should document satisfactory as well as less-than-satisfactory performance.
5. There is no specific time limit for the oral examination. The instructor will take whatever time is necessary to cover the areas selected, and in the depth and scope required. Here the instructor may also discuss the scope and estimated length of the examination.
6. The instructor should not reveal the results of the oral examination at its conclusion.
7. If trainees feel the need for a break during the oral examination, they should request this from the instructor.

APPENDIX C - PERFORMANCE TEST CONSTRUCTION CHECKLIST

Purpose of the Test:

1. Does the test require a skill level that is appropriate? ☐ N/A ☐ YES ☐ NO
2. Is the purpose of the test clearly stated? ☐ N/A ☐ YES ☐ NO
3. Are the objectives of the test clearly stated? ☐ N/A ☐ YES ☐ NO
4. Does the test have a clear relationship with the trainee's job or task duties? ☐ N/A ☐ YES ☐ NO

Administrative Guidelines:

1. Does the test include a segment to help orient the trainee to the requirements of the test? ☐ N/A ☐ YES ☐ NO
2. Have the administrative procedures of the test been clearly spelled out? ☐ N/A ☐ YES ☐ NO

Scoring and Standards:

1. Have the test's scoring criteria been standardized? ☐ N/A ☐ YES ☐ NO
2. Does the test clearly define scoring procedures? ☐ N/A ☐ YES ☐ NO
3. Can the scoring rules be quickly applied by the examiner? ☐ N/A ☐ YES ☐ NO
4. Has the grading criteria been made as objective as possible? ☐ N/A ☐ YES ☐ NO

Instruction Section:

1. Does the test contain a complete set of instructions for the trainee? ☐ N/A ☐ YES ☐ NO
2. Do the instructions address what is expected of the trainee for Perform, Simulate, and Discuss items? ☐ N/A ☐ YES ☐ NO
3. Do the instructors address task performance sequence, critical steps, and results of failure to comply with safety precautions? ☐ N/A ☐ YES ☐ NO

Tools and Equipment:

- | | | | | |
|----|---|------------------------------|------------------------------|-----------------------------|
| 1. | Have all required equipment and materials for the test been listed? | <input type="checkbox"/> N/A | <input type="checkbox"/> YES | <input type="checkbox"/> NO |
| 2. | Has their use been specified at the appropriated level of detail? | <input type="checkbox"/> N/A | <input type="checkbox"/> YES | <input type="checkbox"/> NO |

Performance Steps:

- | | | | | |
|----|---|------------------------------|------------------------------|-----------------------------|
| 1. | Does the test provide a complete and clear listing of all the steps required to perform a task? | <input type="checkbox"/> N/A | <input type="checkbox"/> YES | <input type="checkbox"/> NO |
| 2. | Are critical and sequential steps identified? | <input type="checkbox"/> N/A | <input type="checkbox"/> YES | <input type="checkbox"/> NO |

Conditions and Cues:

- | | | | | |
|----|--|------------------------------|------------------------------|-----------------------------|
| 1. | Have all initiating and terminating cues been described on the test? | <input type="checkbox"/> N/A | <input type="checkbox"/> YES | <input type="checkbox"/> NO |
| 2. | Have all environmental conditions been described on the test? | <input type="checkbox"/> N/A | <input type="checkbox"/> YES | <input type="checkbox"/> NO |
| 3. | Have all equipment conditions been described on the test? | <input type="checkbox"/> N/A | <input type="checkbox"/> YES | <input type="checkbox"/> NO |

Prerequisites:

- | | | | | |
|----|--|------------------------------|------------------------------|-----------------------------|
| 1. | Does the test clearly state prerequisite knowledge, experience, and skills of the trainee? | <input type="checkbox"/> N/A | <input type="checkbox"/> YES | <input type="checkbox"/> NO |
|----|--|------------------------------|------------------------------|-----------------------------|

APPENDIX D - PERFORMANCE TEST REVIEW CHECKLIST

This checklist is designed for use by the test developer when reviewing a performance test with technical experts. The checklist contains questions which can be asked and checked off as each step in the review process is completed.

Technical Accuracy of Items:

1. Have major flaws been identified and corrected? ☐ N/A ☐ YES ☐ NO
2. Have any task steps been omitted? If yes, is test addressing only critical elements? ☐ N/A ☐ YES ☐ NO
3. Have unnecessary task steps been removed? ☐ N/A ☐ YES ☐ NO
4. Is each task step complete? ☐ N/A ☐ YES ☐ NO
5. Have tools and materials been completely specified? ☐ N/A ☐ YES ☐ NO
6. Have performance standards been specified completely? ☐ N/A ☐ YES ☐ NO
7. Are the scoring criteria for the steps clear? ☐ N/A ☐ YES ☐ NO
8. Have all required task cautions been included? ☐ N/A ☐ YES ☐ NO
9. Is the scoring key for discussion items complete? ☐ N/A ☐ YES ☐ NO
10. Has unclear terminology been removed from task steps wherever possible? ☐ N/A ☐ YES ☐ NO
11. Has unclear terminology been removed from performance standards wherever possible? ☐ N/A ☐ YES ☐ NO
12. Has unclear terminology been removed from discussion steps wherever possible? ☐ N/A ☐ YES ☐ NO

Clarity of Items:

1. Have ambiguous performance standards been corrected? ☐ N/A ☐ YES ☐ NO
2. Have ambiguous performance criteria been corrected? ☐ N/A ☐ YES ☐ NO
3. Have ambiguous responses to discussion items been corrected? ☐ N/A ☐ YES ☐ NO

Difficulty of Items:

1. Are the key discussion items at an appropriate difficulty level with the learning objectives ☐ N/A ☐ YES ☐ NO
2. Have overly difficult academic terms been removed from discussion items? ☐ N/A ☐ YES ☐ NO

Position of Test Items:

1. Do items appear in proper sequence as determined by subject matter experts? ☐ N/A ☐ YES ☐ NO

Weighting of Test Items:

1. Is weighting based on safety impact? ☐ N/A ☐ YES ☐ NO
2. Is weighting based on sequenced step performance? ☐ N/A ☐ YES ☐ NO
3. Is weighting based on precise measurement demands? ☐ N/A ☐ YES ☐ NO
4. Is weighting based on symptom diagnosis demands? ☐ N/A ☐ YES ☐ NO

Format of Items:

1. Was a format change from perform to discuss based on step length? ☐ N/A ☐ YES ☐ NO
2. Was a format change from perform to discuss based on a lack of tools? ☐ N/A ☐ YES ☐ NO
3. Was a format change from discuss to perform based on importance? ☐ N/A ☐ YES ☐ NO

Task Coverage of Test:

1. Does the performance test completely cover the task? ☐ N/A ☐ YES ☐ NO
2. If no, what areas are lacking? ☐ N/A ☐ YES ☐ NO
3. If no, what changes are needed? ☐ N/A ☐ YES ☐ NO

Duration of Test:

1. Does test meet target length? ☐ N/A ☐ YES ☐ NO

- | | | |
|----|--|---|
| 2. | If no, is test too long? | <input type="checkbox"/> N/A <input type="checkbox"/> YES <input type="checkbox"/> NO |
| 3. | If test is too long, have hands-on items been changed to discussion? | <input type="checkbox"/> N/A <input type="checkbox"/> YES <input type="checkbox"/> NO |

Scoring Rules of Test:

- | | | |
|----|---|---|
| 1. | How will partial credit be on discussion items? | <input type="checkbox"/> Proportional
<input type="checkbox"/> Intermediate
<input type="checkbox"/> None |
| 2. | Will violation of safety rules constitute automatic failure? | <input type="checkbox"/> N/A <input type="checkbox"/> YES <input type="checkbox"/> NO |
| 3. | Will failure to work steps in the order given on the test constitute automatic failure? | <input type="checkbox"/> N/A <input type="checkbox"/> YES <input type="checkbox"/> NO |

Incorporate Comments:

- | | | |
|----|--|---|
| 1. | Have all discrepancies among SMEs been resolved? | <input type="checkbox"/> N/A <input type="checkbox"/> YES <input type="checkbox"/> NO |
| 2. | Has the revised test been reviewed by SMEs? | <input type="checkbox"/> N/A <input type="checkbox"/> YES <input type="checkbox"/> NO |
| 3. | Have all requested changes been incorporated? | <input type="checkbox"/> N/A <input type="checkbox"/> YES <input type="checkbox"/> NO |
| 4. | What method was used to record SME comments? | <input type="checkbox"/> Tape recording
<input type="checkbox"/> Direct copy
<input type="checkbox"/> Note taking |

APPENDIX E
SAMPLE PERFORMANCE TEST

TEST ID# _____	REV.# _____	PAGE <u>1</u> OF <u>5</u>
TASK #: 8123506447-3	TASK TITLE: Inspect Lube Oil Cooler (water side) Emergency Diesel Engine	AVG. TIME TO PERFORM: 3 Hours
PREREQUISITES: 1. PMT General Course 2. Facility General Course 3. Facility Specific SE-204 Diesel Generator Course		
REFERENCES: 1. NMPT 801.A1 - Emergency Diesel Engine Technical Specification 2. NMPT 801.B - Emergency Diesel Preventive Maintenance Procedure 3. NMPT Form 801 - Preventive Maintenance Report 4. NMPT Facility Plan A-804.402 5. NMPT 101.90 - System Depressurization		
APPROVAL: _____ <div style="display: flex; justify-content: space-around; width: 100%;"> Title Date </div> <div style="display: flex; justify-content: space-around; width: 100%;"> _____ _____ </div> <div style="display: flex; justify-content: space-around; width: 100%;"> Title Date </div>		
INSTRUCTIONS TO EVALUATOR: 1. This evaluation standard contains the details for the evaluation of knowledge and practical requirements. 2. Prior to administering the performance test, ensure that the trainee has completed all related training. 3. Prior to administering the performance test, read the "Instructions to the Examinee" to the trainee and review the conditions with him/her. Also, ensure the materials listed are on hand and available for use. 4. When evaluating knowledge requirements, only ask those questions listed in the Knowledge Requirements section. Compare the trainee's response with the answer provided to determine if the question is answered correctly. Failure of any two questions constitutes failure of the performance test. 5. When evaluating task performance, the trainee is expected to perform the steps in sequence. A "Sat" can only be awarded after the trainee achieves the listed standard. If a question is included with a step, it must be asked and answered before proceeding with the evaluation. Mark each step as "Sat" or "Unsat." Performing any step out of sequence, failing two or more non-critical steps, or any single critical step constitutes a failure of the performance test. 6. Coaching is not permitted during an evaluation. Stop the evaluation when actions may result in damage to personnel or equipment. 7. Ensure all the information in the Scoring/Remarks section is correct and complete and that you and the trainee have signed the performance test. 8. Notify trainee of his/her score immediately upon completion of the performance test.		

APPENDIX E
SAMPLE PERFORMANCE TEST

TEST ID# _____	REV.# _____	PAGE <u>2</u> OF <u>5</u>
TASK #: 8123506447-3	TASK TITLE: Inspect Lube Oil Cooler (water side) Emergency Diesel Engine	AVG. TIME TO PERFORM: 3 Hours
<p>INSTRUCTIONS TO EXAMINEE:</p> <ol style="list-style-type: none"> 1. The purpose of this performance test is to evaluate your ability to inspect the lube oil cooler (water side) on the Emergency Diesel Engine. The knowledge and skills that are evaluated by this test are directly related to those that you will perform on the job. 2. Before starting, I will state the performance terminal objective, any initiating cues, and I will answer any questions you may have. 3. When I tell you to begin, you are to inspect the lube oil cooler (water side) on the Emergency Diesel Engine. I will describe the initial conditions associated with the task and will ensure that necessary equipment or resources will be available to you. 4. For each step in the task, you are to state what you will do and what result you expect to see in response to your action. 5. At any point, I may stop you and ask you questions regarding the steps, sequence, acceptance criteria, or the effects your actions will have upon the system or component with which you are working or related systems and components 6. If you perform any two non-critical steps or one critical step improperly or perform a step out of sequence, you will fail this test. If you fail, additional training will be provided and you will be evaluated at a later date. 		
<p>PERSONNEL/EQUIPMENT SAFETY:</p> <p>Burn hazard Damage to diesel Danger from fluids under pressure</p>		
<p>TOOLS/EQUIPMENT:</p> <p>Protective gloves, face shield, hand tools rigging equipment, lint-free rags, crow bar, gasket scraper, and gasket material.</p>		
<p>PERFORMANCE TERMINAL OBJECTIVE:</p> <p>Given that applicable references, equipment, and materials are available, inspect the lube oil cooler on the emergency diesel engine starting engine in accordance with references 1 through 5.</p>		
<p>INITIAL CONDITIONS:</p> <p>Diesel tagged out and affected portion of lubricating oil system drained and depressurized.</p>		
<p>INITIATING CUES:</p> <p>Directed by evaluator to begin.</p>		

APPENDIX E
SAMPLE PERFORMANCE TEST

TEST ID# _____	REV.# _____	PAGE <u>3</u> OF <u>5</u>
TASK #: 8123506447-3	TASK TITLE: Inspect Lube Oil Cooler (water side) Emergency Diesel Engine	AVG. TIME TO PERFORM: 3 Hours

PERFORMANCE CHECKLIST					
	Action Step	Standards	*	Sat	Unsat
P	1. Obtained reference	Trainee obtained latest revised copies of the procedures			
P	2. Obtain equipment	In accordance with NMPT A - 804.402			
P	3. Verify diesel tagged out	In accordance with NMPT 101.90			
P	4. Verify lubricating oil and cooling water system drained and depressurized	In accordance with NMPT 801.B			
P	5. Disconnect oil supply and return from lube oil cooler	In accordance with NMPT 801.B			
P	6. Disconnect water side supply and return from lube oil cooler	In accordance with NMPT 801.B			
P	7. Remove lube oil cooler from mounting brackets	In accordance with NMPT 801.B			
P	8. Remove lube oil cooler end bells	In accordance with NMPT 801.B			
P	9. Remove lube oil cooler tube bundle	In accordance with NMPT 801.B			
P	10. Perform inspection and document results	In accordance with NMPT Form 801			
P	11. Complete Preventive Maintenance Report	In accordance with NMPT 801.B			
P	12. Reinstall tube bundle	In accordance with NMPT 801.B			
P	13. Reinstall end bell	In accordance with NMPT 801.B			
P	14. Reinstall lube oil cooler into mounting bracket	In accordance with NMPT 801.B			
P	15. Reconnect oil supply and return from lube oil cooler	In accordance with NMPT 801.B			
P	16. Reconnect water side supply and return from lube oil cooler	In accordance with NMPT 801.B			
P	17. Return equipment				
P	18. Return references				

CODES: *	(S) Sequence is important. This step must be performed only after the preceding step(s). (C) Critical step. Failure to meet standards for this item constitutes failure of the test. P, S, D, and O refer to performance methods Perform, Simulate, Discuss and Observe/Discuss.
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APPENDIX E
SAMPLE PERFORMANCE TEST

TEST ID# _____	REV.# _____	PAGE <u>4</u> OF <u>5</u>
TASK #: 8123506447-3	TASK TITLE: Inspect Lube Oil Cooler (water side) Emergency Diesel Engine	AVG. TIME TO PERFORM: 3 Hours
<p>KNOWLEDGE REQUIREMENTS: Directions to Evaluator:</p> <p style="padding-left: 40px;">Ask the question exactly as it appears on this form. If the trainee answers differently than the accepted answer, write the exact words of the answer in the comment section.</p>		
ORAL QUESTIONS	CRITICAL CONTENT FOR ACCEPTABLE ANSWERS	INITIALS
<div style="display: flex; justify-content: space-between;"> <div style="width: 30%;"> <p>1. State the precautions associated with removal of the tube bundle.</p> <p>Pass _____ Fail _____</p> <p>Comments:</p> </div> <div style="width: 60%;"> <p>1. Tubes are sensitive to impact damage. 2. Damaged tubes may increase oil temperature which may cause damage to diesel.</p> </div> </div>		
<div style="display: flex; justify-content: space-between;"> <div style="width: 30%;"> <p>Pass _____ Fail _____</p> <p>Comments:</p> </div> <div style="width: 60%;"></div> </div>		
<div style="display: flex; justify-content: space-between;"> <div style="width: 30%;"> <p>Pass _____ Fail _____</p> <p>Comments:</p> </div> <div style="width: 60%;"></div> </div>		
<div style="display: flex; justify-content: space-between;"> <div style="width: 30%;"> <p>Pass _____ Fail _____</p> <p>Comments:</p> </div> <div style="width: 60%;"></div> </div>		

APPENDIX E
SAMPLE PERFORMANCE TEST

TEST ID# _____	REV.# _____	PAGE <u>5</u> OF <u>5</u>
TASK #: 8123506447-3	TASK TITLE: Inspect Lube Oil Cooler (water side) Emergency Diesel Engine	AVG. TIME TO PERFORM: 3 Hours
<p>KNOWLEDGE REQUIREMENTS:</p> <p>Total number of questions: _____</p> <p>Total number of correct responses: _____</p> <p>Comments: _____</p> <p>PERFORMANCE REQUIREMENTS:</p> <p>Number of critical steps missed: _____</p> <p>Number of non-critical steps missed: _____</p> <p>Comments: _____</p> <p>OVERALL EVALUATION:</p> <p>Pass _____ Fail _____</p> <p>OVERALL COMMENTS: _____</p>		
<p>SIGNATURES:</p> <p>Evaluator's Signature _____ Date _____</p> <p>Evaluator's Name _____ Title _____</p> <p>Trainee's Signature _____ Date _____</p> <p>Trainee's Name _____ ID _____</p>		

APPENDIX F
JOB PERFORMANCE MEASURE

JPM #:	REV #:
TASK #/TITLE:	30-21-150-002-004 Calibrate Honeywell ElectroniK 17 Temperature Recorder

RELATED TASK(S):

EMBEDDED TASK(S): START-A-TASK;

 FINISH-A-TASK

The contents of the JPM package include the following sections:

- Section I Evaluator Guide
 - A. Instructions
 - B. Evaluation Guide (Confidential)
 - C. Qualification Card

- Section II Trainee Guide
 - A. Instructions
 - B. Guide

APPENDIX F
JOB PERFORMANCE MEASURE

JPM #:	REV #:
TASK #/TITLE:	30-21-150-002-004 Calibrate Honeywell ElectroniK 17 Temperature Recorder

SECTION I - EVALUATOR GUIDE

Section I.B of this document is considered test material and as such can not be left unattended nor given to the trainee.

A. EVALUATOR INSTRUCTIONS

BE ADVISED THAT SECTION I.B. "EVALUATION GUIDE" IS CONFIDENTIAL AND ITS CONTENTS CANNOT BE DISCUSSED WITH OR SHOWN TO THE TRAINEE PRIOR TO THE EVALUATION.

Directions:

1. Verify that the prerequisites and training requirements have been fulfilled:
 - a. Review Section I.C. "Qualification Card" to verify that the "Prerequisites" have been signed off by the Training Coordinator.
 - b. Review Section I.C. "Qualification Card" to verify that "Training" has been signed off by the OJT Trainer.
2. Set-up the JPM as follows:
 - a. Materials: Loveland 450 A Temperature Calibrator (Category 1); Type K Thermocouple Extension Wire; Chart Paper; Pen cartridge.
 - b. Actions Required: Approved Work Clearance Permit or Management/Supervision Authorization to perform calibration.
 - c. Faults: N/A for this JPM.
3. Provide the trainee Section II-Trainee Guide.
4. Allow sufficient time for the Trainee to review the Trainee Instructions and Guide.

APPENDIX F
JOB PERFORMANCE MEASURE

JPM #:	REV #:
TASK #/TITLE:	30-21-150-002-004 Calibrate Honeywell ElectroniK 17 Temperature Recorder

5. Review with the trainee the Trainee Instructions on page 10 and the Evaluation/Scoring Procedure on page 4.
6. Do Not provide hints or coaching during the evaluation. The trainee must rely on approved procedures, references, and resources.
7. On you initiating cue, begin the evaluation.
8. At each hold point, verify that the trainee has performed the step(s) IAW with the listed standard(s).
9. At completion of all evaluation activities, complete the final scoring and debrief the trainee.
10. Upon completion of the trainee debriefing, ensure that the Evaluator portion of Section I.C., "Qualification Card" is completed, signed, and dated.
11. Have Trainee sign and date Trainee portion of Section I.C., "Qualification Card."
12. Return the **entire JPM** package (Section I and II) to the training coordinator.

Evaluation/Scoring Procedure

For each step, or series of steps, circle an "**S**" for satisfactory or "**U**" for unsatisfactory. If the trainee is able to correctly demonstrate the step, IAW with the specified standard(s), the evaluator will circle the appropriate "**S**" in the rating column indicating satisfactory completion. However, if the trainee fails to perform correctly, the evaluator must circle "**U**" in the rating column indicating a failure of the action.

To receive an overall grade of satisfactory for the **JPM**, the trainee shall obtain an "**S**" on all critical steps and receive not more that a total of three (3) unsatisfactory "**U**" grades on all noncritical steps.

APPENDIX F
JOB PERFORMANCE MEASURE

JPM #:	REV #:
TASK #/TITLE:	30-21-150-002-004 Calibrate Honeywell ElectroniK 17 Temperature Recorder

B. EVALUATION GUIDE

Reference (REF):

1. 3-10569, Honeywell ElectroniK 17 Temperature Recorder Calibration and Maintenance
2. 300-235, Procedure Generation-Reactor Materials PMT
3. 300-239, Measuring and Test Equipment Program Requirements
4. 300-815, Reactor Materials PMT Record Management
5. S-9501, Electrical Safety Practices
6. 3-10635, Loveland 450A User Guide
7. Vendor Print File (VPF) 6349
8. Honeywell Instruction Manual ElectroniK 17 Strip Chart Recorder 782564-1 (VPF 6227)
9. Safety Manual

Fault Options:

N/A for the JPM

APPENDIX F
JOB PERFORMANCE MEASURE

JPM #:	REV #:
TASK #/TITLE:	30-21-150-002-004 Calibrate Honeywell ElectroniK 17 Temperature Recorder

Practical Requirements:

		<u>REF:</u>	<u>CAT:</u>	<u>MOA:</u>	<u>RATING:</u>
1.	Perform test set-up. Standard: IAW 3-10635 and 3-10569, Section 12.1.	Hold Point	1,6	C	PSOD S U
2.	Perform recorder calibration check. Standard: IAW 3-10569, Section 12.2.	Hold Point	1	C	PSOD S U
3.	Perform recorder calibration (if required). Standard: IAW 3-10569, section 12.3, and all values are within limits specified on the Calibration Data Sheet.	Hold Point	1	C	PSOD S U
4.	Perform recorder maintenance (pen and chart paper replacement) Standard: IAW 3-10569, Section 12.4.	Hold Point	1	C	PSOD S U
5.	Restore recorder to service Standard: IAW 3-10569, Section 12.5.	Hold Point	1	C	PSOD S U

NOTE: CAT: C = CRITICAL NC = NON-CRITICAL MOA: P = PERFORM IAW = In Accordance With	RATING: S = SATISFACTORY U = UNSATISFACTORY REF: = REFERENCES
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APPENDIX F
JOB PERFORMANCE MEASURE

JPM #:	REV #:
TASK #/TITLE:	30-21-150-002-004 Calibrate Honeywell ElectroniK 17 Temperature Recorder

C. QUALIFICATION CARD

SECTION I.B. OF THIS DOCUMENT IS CONSIDERED TEST MATERIAL AND AS SUCH CAN NOT BE LEFT UNATTENDED NOR GIVEN TO THE TRAINEE. THE TRAINEE IS REQUIRED TO SIGN THE QUALIFICATION CARD FOLLOWING THE EVALUATION DEBRIEFING.

Name: _____ Date: _____

SSN: _____ Work Group: _____

Method of accomplishment: Perform (P)

Prerequisites: Start-A-Task and Finish-A-Task; "Measuring & Test Equipment" - Course #0080; Radiation Contamination and Control Training

Signed: _____
Training Coordinator/Date

Training: OJT GUIDE NRDE100AO0100

Signed: _____
Trainer/Date

Practical Requirements:

	<u>REF:</u>	<u>CAT:</u>	<u>MOA:</u>	<u>RATING:</u>
1. Perform test set-up.	1,6	C	PSOD	S U
2. Perform recorder calibration check.	1	C	PSOD	S U
3. Perform recorder calibration (if required).	1	C	PSOD	S U
4. Perform recorder maintenance. (pen and chart paper replacement)	1	C	PSOD	S U
5. Restore recorder to service.	1	C	PSOD	S U

APPENDIX F
JOB PERFORMANCE MEASURE

JPM #:	REV #:
TASK #/TITLE:	30-21-150-002-004 Calibrate Honeywell ElectroniK 17 Temperature Recorder

JPM COMPLETION:

TO RECEIVE AN OVERALL GRADE OF SATISFACTORY FOR THE JPM, THE TRAINEE SHALL OBTAIN AN "S" ON ALL CRITICAL STEPS AND RECEIVE NOT MORE THAN A TOTAL OF THREE (3) UNSATISFACTORY "U" GRADES ON ALL NONCRITICAL STEPS.

(Circle One) Satisfactory Unsatisfactory

EVALUATOR COMMENTS:

EVALUATOR:

(Print Name) (Signature) (Date)

TRAINEE: *I VERIFY THAT I HAVE COMPLETED THE REQUIREMENTS AS STIPULATED IN THIS JOB PERFORMANCE MEASURE.*

(Print Name) (Signature) (Date)

SUPERVISOR: *I HAVE REVIEWED THIS JPM WITH THE TRAINEE AND AM SATISFIED ALL TRAINING AND QUALIFICATION REQUIREMENTS HAVE BEEN MET. THE ABOVE NAMED TRAINEE IS RECOMMENDED FOR QUALIFICATION.*

(Print Name) (Signature) (Date)

FACILITY MANAGER: *QUALIFICATION APPROVED.*

(Print Name) (Signature) (Date)

Note to Manager: *Upon completion of this JPM, return the entire JPM package to the training coordinator.*

APPENDIX F
JOB PERFORMANCE MEASURE

JPM #:	REV #:
TASK #/TITLE:	30-21-150-002-004 Calibrate Honeywell ElectroniK 17 Temperature Recorder

SECTION II - TRAINEE GUIDE

A. TRAINEE INSTRUCTIONS

Directions:

1. This job performance measure (JPM) will be conducted under the guidance and direction of an evaluator. Any difficulties encountered during this evaluation must be directed to the evaluator.
2. You will be given Section II of this JPM. Read each element to be performed prior to actually performing it. This is an evaluation of your performance using a "Satisfactory" (S) and "Unsatisfactory" (U) scoring system.

Note that this JPM may contain **Hold Points** which require the evaluator's verification and initials prior to proceeding to the next step. Violation of any hold point and/or safety rule and/or security terminates the evaluation. Compliance with approved facility procedures supersedes the elements of this JPM.

Scoring System

To receive an overall grade of satisfactory for the **JPM**, the trainee shall obtain an "S" on all critical steps of the process and receive not more than a total of three (3) unsatisfactory "U" grades on all non-critical steps.

B. TRAINEE GUIDE

Task Conditions:

Given a Honeywell ElectroniK 17 Temperature Recorder, Work Clearance Permit, and the applicable maintenance procedure(s).

APPENDIX F
JOB PERFORMANCE MEASURE

JPM #:	REV #:
TASK #/TITLE:	30-21-150-002-004 Calibrate Honeywell ElectroniK 17 Temperature Recorder

Task Standards:

The Honeywell Temperature Recorder must operate in accordance with plant specifications, approved maintenance procedures and within the specifications of the applicable Calibration Data Sheet (CDS). No personnel injuries, safety or procedure violations. No damage to equipment or components.

Prerequisites:

Start-A-Task and Finish-A-Task; "Measuring & Test Equipment" - Course #0080; Radiation Contamination and Control Training.

Precautions:

High temperatures may exist in the immediate proximity of the Honeywell Recorder. Exercise caution when connecting/disconnecting terminals due to restricted access at the rear of the Honeywell Recorder. Notify Health Protection if their assistance is required.

Equipment/Materials/Tools:

SAFETY EQUIPMENT:	As required.
EQUIPMENT:	Loveland 450 A Temperature Calibrator (Category 1); Type K Thermocouple Extension Wire.
MATERIALS:	Chart Paper; Pen cartridge.
HAND TOOLS:	As required.

Initial Conditions:

Work Clearance Permit completed, equipment/materials available, Health Protection Operations have been notified if their assistance is required. The M&TE and other required information asked for at the top of the CDS is filled in, and the Category 1 M&TE is verified to be within its calibration due date.

APPENDIX F
JOB PERFORMANCE MEASURE

JPM #:	REV #:
TASK #/TITLE:	30-21-150-002-004 Calibrate Honeywell ElectroniK 17 Temperature Recorder

Initiating Cue:

Directed by the OJT Evaluator.

Estimated Time:

Method of Accomplishment (MOA):

Perform

References:

1. 3-10569, Honeywell ElectroniK 17 Temperature Recorder Calibration and Maintenance
2. 300-235, Procedure Generation-Reactor Materials PMT
3. 300-239, Measuring and Test Equipment Program Requirements
4. 300-815, Reactor Materials PMT Record Management
5. S-9501, Electrical Safety Practices
6. 3-10635, Loveland 450A User Guide
7. Vendor Print File (VPF) 6349
8. Honeywell Instruction Manual ElectroniK 17 Strip Chart Recorder 782564-1 (VPF 6227)
9. Safety Manual

APPENDIX F
JOB PERFORMANCE MEASURE

JPM #:	REV #:
TASK #/TITLE:	30-21-150-002-004 Calibrate Honeywell ElectroniK 17 Temperature Recorder

Practical Requirements:

1. Perform test set-up.

Reference: 3-10635 and 3-10569.

Hold Point

2. Perform recorder calibration check.

Reference: 3-10635 and 3-10569.

Hold Point

3. Perform recorder calibration (if required).

Reference: 3-10569.

Hold Point

4. Perform recorder maintenance (pen and chart paper replacement).

Reference: 3-10569.

Hold Point

5. Restore recorder to service.

Reference: 3-10569.

Hold Point